

**Table 4-12
Effect of Land Use and Water Use on Salt Loading**

(1) Land Use	(2) Source Water Applied	(3) Conc (mg/L)	(4) Irrigation Efficiency	(5) Effective Precipitation Volume (ft)	(6) Conc (mg/L)	(7) Evapo- transpiration (ft)	(8) Mass Added Through Use (tons)	(9) Return Flow (ft)	(10) Return Due to ET (mg/L)	(11) Flow Due to Mass Added (mg/L)	(12) Concentration Total Conc (mg/L)	(13) Mass (tons)
<i>Irrigated Alfalfa without Dairy Waste Application</i>												
Alfalfa	3.3	250	75%	0.8	100	3.3	0.176	0.8	1,104	156	1,260	1.4
Alfalfa	3.3	500	75%	0.8	100	3.3	0.176	0.8	2,108	156	2,264	2.6
Alfalfa	3.3	750	75%	0.8	100	3.3	0.176	0.8	3,112	156	3,268	3.7
Alfalfa	3.3	1000	75%	0.8	100	3.3	0.176	0.8	4,116	156	4,272	4.8
<i>Irrigated Alfalfa with Solid Dairy Waste Application at 12 tons per acre</i>												
Alfalfa	3.3	250	75%	0.8	100	3.3	1.3	0.8	1,104	1,151	2,255	2.5
Alfalfa	3.3	500	75%	0.8	100	3.3	1.3	0.8	2,108	1,151	3,259	3.7
Alfalfa	3.3	750	75%	0.8	100	3.3	1.3	0.8	3,112	1,151	4,263	4.8
Alfalfa	3.3	1000	75%	0.8	100	3.3	1.3	0.8	4,116	1,151	5,267	5.9
<i>Irrigated Alfalfa with Solid and Liquid Dairy Waste Application at 12 and 1.2 Tons, Respectively</i>												
Alfalfa	3.3	250	75%	0.8	100	3.3	1.4	0.8	1,104	1,240	2,344	2.6
Alfalfa	3.3	500	75%	0.8	100	3.3	1.4	0.8	2,108	1,240	3,348	3.8
Alfalfa	3.3	750	75%	0.8	100	3.3	1.4	0.8	3,112	1,240	4,352	4.9
Alfalfa	3.3	1000	75%	0.8	100	3.3	1.4	0.8	4,116	1,240	5,356	6.0
<i>Urban Residential with Municipal Supplies</i>												
Residential	3.7	250	75%	0.6	100	3.4	0.147	0.9	1,068	116	1,184	0.5
Residential	3.7	300	75%	0.6	100	3.4	0.147	0.9	1,268	116	1,384	0.5
Residential	3.7	350	75%	0.6	100	3.4	0.147	0.9	1,468	116	1,584	0.6
Residential	3.7	400	75%	0.6	100	3.4	0.147	0.9	1,668	116	1,784	0.7

(2) = Alfalfa ET from Table 19 of DWR Bull 113-3 divided by irrigation eff in column (4)

(5) = Alfalfa ET from Table 18 of DWR Bull 113-3 minus alfalfa ET from Table 19 of DWR Bull 113-3

(7) = Alfalfa ET from Table 18 of DWR Bull 113-3

(8) = Table 7 from WRE *Unit Water Requirements and Waste Increments*, 1970; and Figure III-1a from the RWQCB *Dairies and Their Relationship to Water Quality Problems in the Chino Basin*, 1990

(13) urban mass adjusted to 30 percent due to 70 percent imperviousness